BEFORE THE
PUBLIC SERVICE COMMISSION OF WISCONSIN

Application of the Milwaukee Water Works
for Authority to Increase Water Rates — Docket 3720-WR-108

REBUTTAL TESTIMONY OF JOHN WRIGHT ON BEHALF OF MILWAUKEE WATER WORKS

Q. Please state your name and business address.

A. John J. Wright, 12385 East Arapahoe Road, Tower II, Suite 600, Centennial, CO, 80112.

Q. Have you previously filed direct testimony in this docket?

A. Yes.

Q. What is the purpose of you rebuttal testimony?

A. My rebuttal testimony will address certain portions of the direct testimony filed on behalf of the Wholesale Customer Group by Mr. Andrew Behm, Mr. Christopher Kaempfer, and Mr. Eric Rothstein. I will also address one item in the direct testimony filed by Phillip Q. Hanser on behalf of MillerCoors.

Q. Is MWW's proposed methodology for allocating public fire protection costs the same as that sponsored by Mr. Andrew Behm in MWW's last rate case?

A. Yes. In Docket No. 3720-WR-107, while serving as a member of the PSC staff, Mr. Behm sponsored a population-based methodology for determining public fire flows and allocating public fire protection costs. Mr. Behm describes this methodology at page 19 of his direct testimony in Docket No. 3720-WR-107 at, Ex.-MWW-Wright-3.

The Commission adopted Mr. Behm's public fire protection methodology in Docket No. 3720-WR-107 (PSC REF#:144469) and MWW has proposed this same methodology in this docket. It was MWW's hope that using Mr. Behm's Commission-adopted methodology in this rate case would minimize litigation. Clearly, our optimism in this regard was misplaced.

Q. What is your reaction to Mr. Behm's rejection of this previously recommended methodology for allocating public fire protection costs?

A. Mr. Behm's reversal of position regarding wholesale public fire protection issues is astonishing. In MWW's 2009 rate case Mr. Behm took the position that public fire protection costs ***should*** be allocated to wholesale customers using a population-based methodology. Mr. Behm even expressed concern that his proposed methodology would have a disproportionate cost of service effect on MWW's retail customers. For this reason, he proposed a smoothing approach to lower MWW's public fire flows from 19,440,000 gallons to 12,960,000 gallons. Mr. Behm estimated that this change, which was ultimately rejected by the Commission, would ***decrease*** the public fire protection costs borne by MWW's retail customers by $406,000 while ***increasing*** the public fire protection costs of suburban retail and wholesale customers by $229,000 and $176,000 respectively (see Mr. Behm's Supplemental Direct Testimony in Docket No. 3720-WR-107, pages SD12.15-16, Ex.-MWW-Wright-4).

In this docket, Mr. Behm has not only rejected his own population-based methodology for determining public fire flows and allocating public fire protection costs, but he has also taken the position that MWW's wholesale customers ***should not*** be

allocated ***any*** public fire protection costs. Mr. Behm's reversal of position is obviously disappointing.

Q. Do you agree with Mr. Behm's argument that wholesale customers already pay for public fire protection costs in the General Service rates charged by MWW?

A. No. Mr. Behm's testimony in this regard is based on his assertion that wholesale customers meet their public fire flow demands in excess of general consumption through the use of elevated storage reservoirs. He further asserts that these storage reservoirs are then replenished in a manner consistent with normal general consumption. Thus, from Mr. Behm's perspective, wholesale customers already pay for all of the water demands they impose on the MWW system through the General Service rates they pay for metered consumption.

I am not an engineer and cannot address the technical assertions made by Mr. Behm, who I would note is also not an engineer. Nonetheless, I can address the question of whether the General Service rates currently paid by MWW's wholesale customers include the cost of the public fire protection services. In Docket No. 3720-WR-107, the cost of service study adopted by the Commission utilized the base-extra capacity cost allocation methodology as generally described in Chapters III.1 and III.2 of AWWA Manual M1. Under this cost allocation approach, both the direct and indirect costs incurred to provide public fire protection service are estimated. This results in the quantification of an explicit public fire protection component of the overall utility revenue requirement. In the State of Wisconsin, this public fire protection revenue requirement has traditionally been allocated to each customer class receiving public fire protection service based on their proportionate share of estimated total public fire flow

demands - including wholesale customers who receive public fire protection service. This cost allocation also already reflects differences in how MWW provides public fire protection service to retail and wholesale customers. Wholesale customers are not allocated any costs related to distribution or storage, if they have their own storage facilities.

In Docket No. 3720-WR-107, the Commission clearly and decisively concluded that MWW does provide public fire protection service to its wholesale customers. (PSC REF#: 144469). By virtue of its approval of MWW's tariff, the Commission also concluded that the costs incurred by MWW to provide public fire protection service should be recovered via explicitly identified public fire protection charges. Thus, the General Service rates currently paid by MWW's wholesale customers do not include the cost of public fire protection service. Further, unless and until the Commission decides that MWW's wholesale customers do not receive public fire protection service, or that the cost of such services should be incorporated into MWW's General Service rates, this will always be the case.

Q. Do you have any comments regarding the public fire protection-related direct testimony submitted by Mr. Eric Rothstein on behalf of the Wholesale Customer Group?

A. Like Mr. Behm, Mr. Rothstein has also taken the position that MWW's wholesale customers should not be allocated any public fire protection costs. I have only two observations regarding Mr. Rothstein's testimony on this matter. First, regardless of what may or may not be common national practice regarding the allocation of public fire

protection costs to wholesale customers, it is the Commission's common practice to do so in the State of Wisconsin.

Second, I was also a contributing author to the Sixth Edition of AWWA Manual M1. As Mr. Rothstein correctly notes, the example cost allocations provided in Manual M1 do not show the allocation of public fire protection costs to wholesale customers. However, I am unaware of any discussion in Manual M1 that specifically discourages the allocation of public fire protection costs to wholesale customers. In addition, it is important to note that Manual M1 cannot possibly cover the entire universe of ratemaking issues that arise in the water utility industry. Further, for both space limitation and readability reasons, the cost allocation example in Manual M1 was of limited complexity. Therefore, Manual M1's failure to provide a cost allocation example featuring the allocation of public fire protection costs to wholesale customers provides absolutely no basis for the Commission to make the major change of disallowing the allocation of public fire protection costs to MWW's wholesale customers.

Q. Do you have any comments regarding the direct testimony submitted by Mr. Christopher Kaempfer on behalf of the Wholesale Customer Group?

A. MWW witness Patrick Pauly will address the technical assertions made by Mr. Kaempfer in his direct testimony. I would simply note that Mr. Kaempfer's direct testimony does not explicitly address the key questions considered by the Commission when it decided to allocate no public fire protection costs to the Franklin Municipal Water Utility (Franklin) in the Commission’s July 23, 2012 Final Decision (PSC REF#: 168775) in the 2011 Oak Creek Water and Sewer Utility (Oak Creek) rate case (Docket No. 4310-WR-104).

The Commission's decision in the Oak Creek rate case was based on the Commission's consideration of a very specific pattern of facts demonstrating that Franklin received no public fire protection benefits from the Oak Creek system"[d]ue to contractual and operational relationships." Oak Creek Final Decision at 17 (PSC REF#: 168775). In fact, Franklin and its witnesses went to great lengths in that case to distinguish the Oak Creek/Franklin public fire protection fact pattern from the relationship between Milwaukee and its wholesale customers. See for example, Rebuttal-Franklin-Bennett-7-8, Ex.-MWW-Wright-5.

The factors that Mr. Kaempfer asked the Commission to consider were perhaps best summarized in pages 25 - 28 of the initial post-hearing brief of the wholesale intervenors in Docket No. 4310-WR-104 (PSC Ref#: 165261), Ex.-MWW-Wright-6; Rebuttal-Franklin-Kaempfer-7-8, Ex.-MWW-Wright-7. They are:

1) **Franklin has adequate storage to meet its own public fire flows under maximum day demand conditions.** In this case, Mr. Kaempfer asserts that several of MWW's existing wholesale customers should not receive an allocation of public fire protection costs. As a non-technical reader of Mr. Kaempfer's direct testimony, it does not appear that he has explicitly demonstrated that these wholesale customers can meet their public fire flow requirements under maximum day demand conditions. As noted by Mr. Kaempfer in Direct-Franklin-Kaempfer-4, the criteria established by the American Water Works Association is to design water systems assuming that a fire occurs during the maximum day demand. (Ex.-MWW-Pauly-1).

2) **Oak Creek does not guarantee that it would provide Franklin with adequate public fire flows during periods of maximum day demand.** The water

supply agreement between Oak Creek and Franklin contained an explicit provision that allowed Oak Creek to limit Franklin's water use during emergency situations on the Oak Creek system. Mr. Kaempfer's direct testimony in this docket fails to address whether such contractual limitations exist in the water supply agreements that MWW has with the wholesale customers who he asserts should not receive an allocation of public fire protection costs.

3) **Flow control devices at the interconnection points between Oak Creek and Franklin make it impossible for Oak Creek to supply maximum day demands plus fire flows.** Franklin deliberately installed flow control devices that limited the amount of water supplied by Oak Creek to the maximum day flow limit contained in the water supply agreement with Oak Creek. Direct-Frankin-Kaempfer-5, Ex.-MWW-Pauly-1. As a result, Oak Creek is now physically incapable of supplying Franklin's fire flows during periods of maximum day demand. Mr. Kaempfer's direct testimony in this docket provides a description of the capacity of the flow control devices installed at wholesale customer interconnection points with the MWW system. However, his direct testimony makes no specific assertion that MWW cannot serve the combined maximum day and fire flow demands of those wholesale customers who he asserts should not receive an allocation of public fire protection costs.

4) **Oak Creek does not have adequate facilities capable of supplying Franklin's maximum day plus fire flow demands.** Mr. Kaempfer successfully asserted that even without the contractual and physical limitations described above, Oak Creek was incapable of meeting Franklin's fire flow demand under maximum day conditions. Rebuttal-Franklin-Kaempfer-7-8, Ex.-MWW-Wright-7. Specifically, Mr. Kaempfer

testified that if Oak Creek had a major fire in its high pressure zone and Franklin had no fire flow capacity of its own, Franklin would be unable to engage a fire on its system with adequate capacity. Mr. Kaempfer's direct testimony in this docket makes no such assertions regarding MWW's capacity to meet the fire flow demand of those wholesale customers who he asserts should receive no allocation of public fire protection costs.

Q. Do you have any additional comments regarding public fire protection issues?

A. Should the Commission make the decision to allocate no public fire protection costs to some, or all, of MWW's wholesale customers, MWW requests that the Commission allow MWW to refile a cost of service study containing revised public fire protection cost of service estimates and customer class allocations.

Q. How do you respond to Mr. Behm's assertion that the wholesale rate of return differential proposed by MWW results in a subsidy for retail customers?

A. I completely disagree with Mr. Behm on this issue. Charging wholesale customers a higher rate of return on net investment rate base does not result in a subsidy. Instead, it provides the urban retail customer/owners of MWW's system with the legitimate compensation they deserve for the risks incurred by MWW to provide wholesale service. As discussed in my direct testimony, the wholesale water supply contracts between MWW and its wholesale customers are not perpetual in nature. Therefore, there is a risk that MWW's wholesale customers will seek to obtain treated water from other sources. If such an eventuality were to occur, MWW may incur a substantial loss of revenue and potentially stranded infrastructure. Further, MWW can only charge wholesale customers based on their actual metered water consumption, not the specific amount of capacity guaranteed by MWW. This results in a risk that MWW will under recover the cost of

infrastructure investment made to serve wholesale customers. MWW's urban retail customer/owners should be compensated for these real and legitimate risks.

Q. Is it normative for wholesale customers to pay a higher rate of return on rate base assets?

A. Absolutely. The Commission has a long history of authorizing a rate of return differential between retail and wholesale customers. The Commission previously found reasonable a 100 basis point differential for MWW in its last rate case (Docket No. 3720-WR-107) and the PSC staff has not objected to a 100 basis point differential for MWW in this docket. In addition the use of a differential rate of return between wholesale and retail customers is discussed in AWWA Manual M1 in both Chapter III.2 (Distributing Costs to Customer Classes) and Chapter V.1 (Outside-City and Wholesale Rates). (Ex.-MWW-Wright-8). The cost allocation example in Chapter III.2 reflects an 8.0% rate of return on outside-city rate base and a 5.2% rate of return on inside-city rate base (page 82). The discussion of outside-city and wholesale rates in Chapter V.1 notes that "..outside city users are charged a fair rate of return to reflect the risks of serving them (as well as the right of the utility owner to earn a rate of return on its investment in assets to provide service to nonowner customers (page 160). In neither of these two chapters in Manual M1 is a differential rate of return discussed as a subsidy.

Q. When does an inappropriate subsidy occur in a utility ratemaking context?

A. A subsidy occurs when one group of customers inappropriately pays for the costs incurred by a utility to serve another group of customers. For example, assume that a hypothetical utility conducts a cost of service study indicating that the correct revenue requirement for the single family residential rate class is $1,000,000 based on their

unique consumption characteristics. If, in an attempt to keep single family residential rates as low as possible, the utility shifts $200,000 of this revenue requirement to the multi-family residential rate class, an inappropriate subsidy will occur.

A more formal definition of a subsidy is provided in the Second Edition of the AWWA publication "*Water Rates, Fees, and the Legal Environment*." (Ex.-MWW-Wright-9). Page 139 of this publication states: "Overcollection or undercollection of revenues from any one class creates subsidies between and among customer classes in direct proportion to the magnitude of the over- or undercollection. The purpose of conducting a COSS is to determine the equitable rate that each customer class should pay to fully recover its allocation of revenue requirements. Rates that do not follow from the COSS are, by definition, inequitable and create subsidies that benefit one class over another."

MWW's legitimate and industry accepted use of a differential that charges wholesale customers a higher rate of return follows directly from the cost of service study. As such, there is no overcollection of revenues from wholesale customers and there is no subsidy.

Q. Why is MWW seeking to reverse the Commission-adopted methodology used to allocate water mains (Account #343) between the transmission and distribution functions in its last rate case?

A. MWW relied on the PSC staff to prepare the cost of service study in its last rate case (Docket No. 3720-WR-107). One of the unfortunate outcomes of MWW's failure to file its own cost of service study was the PSC staff's decision to allocate water mains (Account #343) between the transmission and distribution functions based on original cost as opposed to the metric inch-feet.

The PSC staff member who prepared MWW's cost of service study, and who made the decision to move from an inch-feet allocation to an original cost allocation, was Mr. Behm. The original MWW cost of service study prepared by Mr. Behm featured the allocation of water mains on an inch feet basis (see Mr. Behm's Direct Testimony in Docket No. 3720-WR-107, page D12.11, Ex.-MWW-Wright-3). This was in keeping with the approach used in MWW's 2007 cost of service study (Docket No. 3720-WR-107). As I currently understand it, it was also in keeping with the use of inch-feet as an allocation basis in MWW rate cases dating back to 1980 (Docket No. 3720-WR-1).

Mr. Behm subsequently prepared a revised MWW cost of service study in which, among other things, he changed the allocation of water mains from inch-feet to original cost as proposed by Mr. Rothstein and Mr. Patrick Planton who submitted testimony on behalf of the wholesale intervenors (see Mr. Behm's Supplemental Direct Testimony in Docket No. 3720-WR-107, pages SD12.16-17,Ex.-MWW-Wright-4).

Because MWW did not sponsor its own cost of service study, Mr. Behm's decision to agree with Mr. Rothstein and Mr. Planton rendered the question of how to allocate water mains between the transmission and distribution functions an uncontested issue in Docket No. 3720-WR-107. MWW did not agree with the PSC staff's decision to use original cost at the time. However, because MWW did not sponsor a cost of service study, it had no ability to render an objection on the issue. MWW's use of inch-feet as an allocation basis in this docket provides an opportunity to correct what we believe was a move to a less appropriate cost allocation methodology.

Q. Why does MWW feel that inch-feet is a more appropriate allocation methodology than original cost?

A. As discussed in my direct testimony, the use of inch-feet as a basis for allocating MWW's investment in water mains between the transmission and distribution functions better correlates this investment to the customer demands that specific sized mains are required to meet. The purpose of allocating utility-financed mains is to appropriately allocate depreciation and return-on-investment which are used to provide funding for the rehabilitation and replacement of main infrastructure. Allocating utility financed mains based on an inch-feet basis reflects this purpose and better corresponds with the cost of the eventual replacement of main infrastructure.

Q. Are there other reasons why MWW believes the use of inch-feet results in a more equitable allocation of costs?

MWW's desire is to allocate costs as equitably as possible. The problem with the use of original cost data is that it skews the allocation results toward more recent assets that inherently cost more today due to the effect of construction cost inflation over time. These newer, more recently constructed assets have lower maintenance and repair costs, yet, more of the costs will be allocated to these types of assets.

For example, if more distribution assets were constructed decades ago, the percentage of water main costs allocated to the distribution function under the original cost approach will be lower. This outcome will occur despite the fact that the costs associated with maintaining and repairing these distribution mains will likely be higher today because of their old age.

Conversely, if more distribution assets were constructed recently, the percentage of water main costs allocated to the distribution function under the original cost approach will be higher. This outcome will occur despite the fact that the costs associated with

maintaining and repairing these distribution mains will likely be lower today because of their recent vintage.

An alternative example would be to consider a utility that replaces a significant amount of its transmission main in the test year at a cost of $20 million and none of its distribution mains. Due to this investment alone, if the functional allocation is done on a cost basis, there would be a significant shift in the allocation of mains from distribution to transmission, even though the actual main infrastructure remains identical.

MWW believes the inch-feet approach of allocating water mains between the transmission and distribution functions eliminates this timing bias and more closely aligns depreciation and return-on-investment to funding for the rehabilitation and replacement of main infrastructure.

Q. How do you respond to Mr. Rothstein's assertion that the use of inch-feet is less accurate that the use of original cost.

A. Original cost is an accurate and direct reflection of water main investments from a historical financial accounting perspective. However, for the reasons discussed above, it is not necessarily the most accurate method for allocating the current and future costs of rehabilitating and replacing main infrastructure.

Q. How do you respond to Mr. Hanser's testimony regarding the use of forecasted rather than historical system demand ratios?

A. I think the use of forecasted system demand ratios is an acceptable approach. However, I do not believe that forecasted system demand ratios have a higher probability of being more accurate predictors of actual test-year system operating performance than demand ratios based on recent historical averages. It is also important to note that the

Commission traditionally calculates system demand ratios based on historical averages and I do not know if the use of forecasted system demand ratios would be considered acceptable.

Q. Does this conclude your rebuttal testimony?

A. Yes.